Reading Chemical Equations: In the following equation for photosynthesis :
$6CO_2+12\ H_2O$ + Light $\rightarrow C_6H_{12}O_6 +6\ O_2 +6H_2O$
Numbers and letters written together are molecules ($6CO_2$). The larger script numbers to the left of a molecule are the number of molecules. CO_2 is a molecule made of C for carbon and O for oxygen. There are 6 of these molecules. H_2O is a molecule made of H for hydrogen and O for oxygen. There are 12 of these molecules.

The smaller number is the number of atoms of the element to the left of it. No number means one atom. For CO_2 there is one atom of carbon and two atoms of oxygen. For H_2O, there is one atom of oxygen and two atoms of hydrogen.

A molecule can be made of only one type of atom. In its stable molecular form, oxygen exists as two atoms and is written O_2. to distinguish it from an atom of oxygen O, or ozone, a molecule of three oxygen atoms, O_3. Even though each of these is all oxygen, combining atoms of the same element may give very different properties to the molecule.

In cellular respiration, one can use this information to track the transfer of hydrogen from one side of the equation to the other.
The equation
$6\ CH_2O +12O + 6H_2O \rightarrow 6C\ O_2 +12H_2\ O$ +energy
can be rewritten to show the numbers of atoms of each element in each molecule, multiplying the number of atoms by the number of molecules. The atoms in parenthesis are the molecules. $6\ CH_2O$ is rewritten (6C+12H +6O) by multiplying each atom in the molecule by 6 since there are 6 molecules in this part of the equation. The parenthesis show that it is a molecule. If it is clearer without worrying about molecules then drop the parenthesis.

(6C+12H +6O) +(12O) + (12H+6O) → (6C +12O) +(24H +12O) +energy
↓ ↓ ↓
12 hydrogen + 12 hydrogen = 24 hydrogen
Hydrogen was transferred from sugar and water on the left to water on the right releasing energy in the process.